AMENDMENTS TO THE CLAIMS:

Please amend the claims as follows:

1. (Currently Amended) A method to isolate at least one specific interaction partner of a compound, characterized in that said compound comprises

a functional group that can be chemically, or enzymatically, or chemically and enzymatically altered such that an altered compound-interaction partner complex elutes at a different elution time with respect to the elution time of the same non-altered compound-interaction partner complex in the same chromatographic separation

a chemical structure determining the specific interaction between said compound and its interaction partner; and

a chemically reactive group which reacts with a functionality present in the interaction partner,

said method comprising the following steps:

(a) adding said compound to a complex mixture of molecules~~, containing 100 or more different molecules~~, wherein said compound stably interacts with at least one of said molecules, which is a specific ~~target molecule or~~ interaction partner, thereby forming a compound-interaction partner complex, and wherein said compound does not interact with the majority of said molecules;

(b) separating the resulting complex mixture of molecules and compound-interaction partner complexes into multiple fractions in a first chromatographic step wherein in a fraction derived from said chromatographic step both molecules and compound-interaction partner complexes are present,

(c) chemically, or enzymatically, or chemically and enzymatically altering in each fraction said compound present in at least one compound-interaction partner complex, and

(d) isolating at least one interaction partner that interacts with said compound in a second chromatographic step, wherein the chromatography of steps (b) and (d) is performed with the same or substantially similar type of chromatography.

2. (Previously Presented) The method of claim 1, wherein said complex mixture of molecules is a complex mixture of proteins.

3. (Previously Presented) The method according to claim 2 further comprising the cleavage of said complex mixture of proteins into a protein peptide mixture before performing step (b).

4. (Previously Presented) The method according to claim 1 wherein said complex mixture of molecules is a protein peptide mixture.

5. (Currently Amended) A method according to claim 1 further comprising the step of identifying the ~~targets~~at least one interaction partner.

6. (Previously Presented) The method according to claim 5, wherein said at least one interaction partner is at least one protein or peptide and wherein said identifying step is performed by a mass spectrometric approach, in combination with peptide and protein sequence database searching.

7. (Previously Presented) The method according to claim 6, wherein the identifying step is further based on the mass of the altered compound.

Claims 8-12. (Canceled)

13. (Previously Presented) The method according to claim 1, wherein the compound is a drug, a drug in development, a drug lead, a drug analogue, or a drug derivative.

14. (Currently Amended) The method according to claim 1, wherein the multiple fractions of the primary chromatographic separation obtained in step (b) are pooled to combine a plurality of said fractions having distinct elution times into a plurality of pooled fractions, prior to the second chromatographic step~~in such a way that elution overlap between altered compound-interaction partner complexes originating from different fractions, and between altered compound-interaction partner complexes from one fraction and molecules from one or more other fractions is avoided~~.